

**GAZI UNIVERSITY FACULTY OF MEDICINE**  
**2024-2025 EDUCATIONAL YEAR**  
**YEAR II**  
**CELL- TISSUE INJURY AND BASICS OF THE PHARMACOLOGY COMMITTEE**  
**(28 April - 3 June 2025)**

<b>COURSES</b>	<b>THEORETICAL</b>	<b>LABORATORY</b>	<b>PRACTICAL</b>	<b>TOTAL</b>
Medical Pharmacology	36	-	-	36
Medical Pathology	16	-	-	16
Immunology	20	-	-	20
Nuclear Medicine	4	-	-	4
Radiology	3	-	-	3
Medical Biochemistry	2	-	-	2
<b>TOTAL</b>	<b>81</b>	<b>-</b>	<b>-</b>	<b>81</b>
Elective Courses	10	-	-	10
Medical English	10	-	-	10
Analysis of 3rd Committee Exam and Feedback	1	-	-	1
<b>INTRODUCTION TO MEDICINE</b>				
Evidence Based Medicine	2	-	-	2
Clinical Skills Education (CSE)	-	-	2	2
Problem Based Learning (PBL)	-	-	6	6
<b>TOTAL</b>	<b>104</b>	<b>-</b>	<b>8</b>	<b>112</b>
<b>TOTAL FREE STUDY TIME</b>	<b>52 hours</b>			

24 work day

Free study time definition: Individual studying courses intended for learning in accordance with the present committee

<b>08.05.2025</b>	<b>Thursday</b>	Progress Exam
<b>22.05.2025</b>	<b>Thursday</b>	Student Symposium
<b>14.05.2025</b>	<b>Wednesday</b>	Clinical Skills Education Exam
<b>03.06.2025</b>	<b>Tuesday</b>	Cell- Tissue Injury And Basics Of The Pharmacology Committee Exam + Evidence Based Medicine Exam

Dean	Prof. Dr. Alper CEYLAN
Vice Dean	Assoc. Prof. Asiye UĞRAŞ DİKMEN
Vice Dean	Assoc. Prof. Nazmi Mutlu KARAKAŞ
Head Coordinator	Prof. Dr. Çiğdem ÖZER
Assistant Head Coordinator	Prof. Dr. Mehmet Ali ERGÜN
Assistant Head Coordinator	Prof. Dr. Akif Muhtar ÖZTÜRK
Year II Coordinator	Assist. Prof. Dr. Duygu DAYANIR
Assistant Year II Coordinator	Teach. Assist. Dr. Nihan ÖRÜKLÜ
Assistant Year II Coordinator	Teach. Assist. Dr. Ayşe SOYLU
Assistant Year II Coordinator	Teach. Assist. Dr. H. Betül MOĞOLKOÇ

**MEMBERS OF COMMITTEE**

<b>MEDICAL PATHOLOGY</b>	<b>MEDICAL PHARMACOLOGY</b>	<b>IMMUNOLOGY</b>
Dr. Güldal ESENDAĞLI	Dr. Canan ULUOĞLU	Dr. Vedat BULUT
Dr.Pınar UYAR GÖÇÜN	Dr. Çimen KARASU	Dr. Resul KARAKUŞ
Dr. Betül ÖĞÜT	Dr. Süreyya BARUN	Dr. E. Ümit BAĞRIAÇIK
Dr. Pelin BAYIK	Dr. Ergin DİLEKÖZ	Dr.Ayşegül ATAK YÜCEL
		Dr. Nihan ÖRÜKLÜ
<b>NUCLEAR MEDICINE</b>	<b>RADYOLOGY</b>	<b>MEDICAL BIOCHEMISTRY</b>
Dr. Neşe ILGIN KARABACAK	Dr. Erhan ILGIT	Dr. Cengiz KARAKAYA
Dr. Ü. Özgür AKDEMİR	Dr. Halit ŞENDUR	

<b>Clinical Skill Education</b>	Prof. Dr. Nurten İNAN
<b>Evidence Based Medicine</b>	Prof. Dr. Mehmet Ali ERGUN
<b>Elective Course Coordinator</b>	Assoc. Prof. Dr. Ergin DİLEKÖZ
<b>Problem Based Learning Coordinator</b>	Prof. Dr. Deniz KARÇAALTINCABA

## **CELL AND TISSUE DAMAGE AND THE BASICS OF PHARMACOLOGY COMMITTEE**

### **Objective**

To help explain cell and tissue damage stages and pathogenetic mechanisms, types of inflammation, (hemodynamic) disturbances in blood flow or fluid balance in the pathogenesis of many diseases leading to death and pathogenesis of diseases related to the immune system. To describe the working order of the immune system in pathological events, pharmacokinetics and pharmacodynamics of drugs, factors affecting drug effect, drug adverse effects and intoxications, herbal drugs, drugs acting on the immune system, trace elements and vitamins, pharmacogenetics, new drug development and otakoids, radioactivity, biological effects of radiation, measurement of radiation, imaging with radiopharmaceuticals. To learn oxidant stress and leukocyte biochemistry. To describe systemic and autoimmune vasculitis

### **LEARNING OBJECTIVES**

#### **Knowledge**

LO-200-5-1 Should be able to explain the pathological mechanisms and consequences of cell and tissue damage

LO-200-5-2 Should be able to define types of inflammation, developmental patterns and morphological patterns

LO-200-5-3 Should be able to explain the mechanisms of immune diseases

LO-200-5-4 Should be able to describe the role of immune cells and their role in immune defense

LO-200-5-5 Should be able to define general concepts of pharmacology

LO-200-5-6 Should be able to explain the concepts related to drug pharmacokinetics and pharmacodynamics

LO-200-5-7 Should be able to explain how metabolism and effects of drugs change between individuals / ethnic groups due to genetic differences, explain the steps of new drug development process and explain their mechanisms

LO-200-5-8 Should be able to define autocoids.

LO-200-5-9 Should be able to explain radioactivity, types of radiation used in medicine and basic concepts related to the subject

LO-200-5-10 Should be able to comprehend the interaction of radiation with biological systems and radiation protection principles

LO-200-5-11 Should be able to describe radiopharmaceuticals and their mechanisms of involvement

LO-200-5-12 Should be able to define the mechanisms of leukocyte biochemistry and oxidative stress

LO-200-5-13 Should be able to explain the laboratory tests used in rheumatologic diseases and their follow-up

LO-200-5-14 Should be able to explain the mechanism of autoimmune diseases and vasculitis, how to diagnose, follow and treat

#### **Skill**

LO-200-5-15 Should be able to define radiological methods and electromagnetic wave spectrum

LO-200-5-16 Should be able to define thrombus, coagulation necrosis and caseification necrosis by microscope

LO-200-5-17 Should be able to suture.

LO-200-5-18 Should be able to perform medical dressing.

#### **Attitude**

LO-200-5-19 To recognize the importance of immunology in medicine

LO-200-5-20 To observe the radiological methods associated with almost all disciplines of medicine and to observe different types of energy used during the application of these methods

1st Week	28.04.2025 MONDAY	29.04.2025 TUESDAY	30.04.2025 WEDNESDAY	01.05.2025 THURSDAY	02.05.2025 FRIDAY
08.30-09.20	FREE STUDY TIME	FREE STUDY TIME	Cell injury and its causes Dr. BAYIK	PUBLIC HOLIDAY	FREE STUDY TIME
09.30-10.20	Other receptors in immune response Dr. ÖRÜKLÜ	FREE STUDY TIME	Description of inflammation and pathogenesis Dr. ÖĞÜT	PUBLIC HOLIDAY	FREE STUDY TIME
10.30-11.20	Other receptors in immune response Dr. ÖRÜKLÜ	Pharmacology and general principles of drug action Dr. KARASU	Drug absorption and bioavailability Dr. ULUOĞLU	PUBLIC HOLIDAY	Type II Hypersensitivity Dr. BULUT
11.30-12.20	Leukocyte migration and inflammation Dr. KARAKUŞ	Pharmacology and general principles of drug action Dr. KARASU	Drug absorption and bioavailability Dr. ULUOĞLU	PUBLIC HOLIDAY	Type III Hypersensitivity Dr. BULUT
13.30-14.20	Imaging modalities and the properties of energies other than X rays Dr. ŞENDUR	Medical English	Immunopathological mechanisms in tissue damage Dr. BULUT	PUBLIC HOLIDAY	Free radical metabolism and related diseases Dr. KARAKAYA
14.30-15.20	Radiation dosimetry–biological effects of radiation and principles of protection Dr. KARABACAK	Medical English	Type I Hypersensitivity Dr. BULUT	PUBLIC HOLIDAY	Free radical metabolism and related diseases Dr. KARAKAYA
15.30-16.20	Immune regulation Dr. BAĞRIAÇIK	Elective Course	Drug administration routes and properties of pharmaceutical forms Dr. KARASU	PUBLIC HOLIDAY	FREE STUDY TIME
16.30-17.20	FREE STUDY TIME	Elective Course	Necrosis, Apoptosis Dr. BAYIK	PUBLIC HOLIDAY	FREE STUDY TIME

2nd Week	05.05.2025 MONDAY	06.05.2025 TUESDAY	07.05.2025 WEDNESDAY	08.05.2025 THURSDAY	09.05.2025 FRIDAY
08.30-09.20	FREE STUDY TIME	Intracellular accumulations Dr. BAYIK	Drug biotransformation Dr. ULUOĞLU	Chronic inflammation Dr. ÖĞÜT	FREE STUDY TIME
09.30-10.20	Type IV Hypersensitivity Dr. BULUT	Cellular adaptations Dr. BAYIK	Drug elimination Dr. ULUOĞLU	Drug receptor interaction and mechanisms of action Dr. KARASU	Drug receptor interaction and mechanisms of action Dr. KARASU
10.30-11.20	Acute inflammation Dr. ÖĞÜT	Drug distribution Dr. ULUOĞLU	Transplantation immunology Dr. BULUT	Drug receptor interaction and mechanisms of action Dr. KARASU	Factors modifying drug effect Dr. DİLEKÖZ
11.30-12.20	Acute inflammation Dr. ÖĞÜT	Drug biotransformation Dr. ULUOĞLU	Transplantation immunology Dr. BULUT	Radiation detection – principles of detection and instrumentation Dr. AKDEMİR	Factors modifying drug effect Dr. DİLEKÖZ
13.30-14.20	Immunological tolerance Dr. BAĞRIAÇIK	Medical English	FREE STUDY TIME	PROGRESS EXAM	PBL
14.30-15.20	Immunological tolerance Dr. BAĞRIAÇIK	Medical English	FREE STUDY TIME	PROGRESS EXAM	PBL
15.30-16.20	FREE STUDY TIME	Elective Course	Committee Exam Question Analyze and Feedback Members of the Committee and Coordinators	PROGRESS EXAM	PBL
16.30-17.20	FREE STUDY TIME	Elective Course	FREE STUDY TIME	PROGRESS EXAM	PBL

3rd Week	12.05.2025 MONDAY	13.05.2025 TUESDAY	14.05.2025 WEDNESDAY	15.05.2025 THURSDAY	16.05.2024 FRIDAY
08.30-09.20	FREE STUDY TIME	CSE (Make Up)	CSE EXAM	EBM	Ionizing radiation and X-rays Dr. ILGIT
09.30-10.20	Inflammation and repair Dr. ÖĞÜT	CSE (Make Up)	CSE EXAM	EBM	Characteristics of X- rays and their diagnostic use in medicine Dr. ILGIT
10.30-11.20	Immunomodulation Dr. BULUT	CSE (Make Up)	CSE EXAM	Immune diseases: Introduction Dr. ÖĞÜT	Immunological techniques Dr. ÖRÜKLÜ
11.30-12.20	Immunomodulation Dr. BULUT	CSE (Make Up)	CSE EXAM	Immune diseases: Introduction Dr. ÖĞÜT	Immunological techniques Dr. ÖRÜKLÜ
13.30-14.20	Drug toxicity Dr. DİLEKÖZ	Medical English	CSE EXAM	Time-concentration relationship Dr. ULUOĞLU	PBL
14.30-15.20	FREE STUDY TIME	Medical English	CSE EXAM	Pathology of immune diseases Dr. ESENDAĞLI	PBL
15.30-16.20	FREE STUDY TIME	Elective Course	CSE EXAM	Pathology of immune diseases Dr. ESENDAĞLI	PBL
16.30-17.20	FREE STUDY TIME	Elective Course	CSE EXAM	FREE STUDY TIME	PBL

4th Week	19.05.2025 MONDAY	20.05.2025 TUESDAY	21.05.2025 WEDNESDAY	22.05.2025 THURSDAY	YEAR 1 EXAM 23.05.2025 FRIDAY
08.30-09.20	PUBLIC HOLIDAY	Concentration- response relationship Dr. ULUOĞLU	Amyloidosis Dr. UYAR GÖÇÜN	STUDENT SYMPOSIUM	FREE STUDY TIME
09.30-10.20	PUBLIC HOLIDAY	Redox regulators, antioxidants and vitamines Dr. KARASU	Hemodynamic disorders Dr. UYAR GÖÇÜN	STUDENT SYMPOSIUM	FREE STUDY TIME
10.30-11.20	PUBLIC HOLIDAY	Redox regulators, antioxidants and vitamines Dr. KARASU	Hemodynamic disorders Dr. UYAR GÖÇÜN	STUDENT SYMPOSIUM	FREE STUDY TIME
11.30-12.20	PUBLIC HOLIDAY	Heavy metal toxicity Dr. DİLEKÖZ	Immunomodulators Dr. BARUN	STUDENT SYMPOSIUM	FREE STUDY TIME
13.30-14.20	PUBLIC HOLIDAY	Medical English	Concentration- response relationship Dr. ULUOĞLU	STUDENT SYMPOSIUM	Drug discovery and development Dr. ULUOĞLU
14.30-15.20	PUBLIC HOLIDAY	Medical English	Principles in treatment of acute toxicity Dr. DİLEKÖZ	STUDENT SYMPOSIUM	Pharmacovigilance Dr. ULUOĞLU
15.30-16.20	PUBLIC HOLIDAY	Elective Course	Histamine, Serotonin and Ergot alkaloids Dr. DİLEKÖZ	STUDENT SYMPOSIUM	FREE STUDY TIME
16.30-17.20	PUBLIC HOLIDAY	Elective Course	FREE STUDY TIME	STUDENT SYMPOSIUM	FREE STUDY TIME

5th Week	YEAR 3 EXAM 26.05.2025 MONDAY	27.05.2025 TUESDAY	28.05.2025 WEDNESDAY	29.05.2025 THURSDAY	30.05.2025 FRIDAY
08.30-09.20	FREE STUDY TIME	Pharmaceutics, nutroceutics and phytotherapeutics Dr. KARASU	FREE STUDY TIME	The Eicosanoids: Prostaglandins, Thromboxanes, Leukotrienes, Related Compounds Dr. DİLEKÖZ	FREE STUDY TIME
09.30-10.20	FREE STUDY TIME	Pharmaceutics, nutroceutics and phytotherapeutics Dr. KARASU	FREE STUDY TIME	The Eicosanoids: Prostaglandins, Thromboxanes, Leukotrienes, Related Compounds Dr. DİLEKÖZ	FREE STUDY TIME
10.30-11.20	FREE STUDY TIME	Histamine, Serotonin and Ergot alkaloids Dr. DİLEKÖZ	Vasoactive peptides Dr. DİLEKÖZ	Nitric oxide Dr. KARASU	FREE STUDY TIME
11.30-12.20	FREE STUDY TIME	Vasoactive peptides Dr. DİLEKÖZ	Vasoactive peptides Dr. DİLEKÖZ	General Approach to Intoxications (Panel)	FREE STUDY TIME
13.30-14.20	PBL	Medical English	Radionuclides, Radioactive labelled pharmaceuticals and principles of imaging Dr. AKDEMİR	Autoimmunity Dr. ATAĞ YÜCEL	FREE STUDY TIME
14.30-15.20	PBL	Medical English	Radioactivity, Atomic structure and Interaction of radiation with matter Dr. AKDEMİR	Autoimmunity Dr. ATAĞ YÜCEL	FREE STUDY TIME
15.30-16.20	PBL	Elective Course	FREE STUDY TIME	Autoimmunity Dr. ATAĞ YÜCEL	FREE STUDY TIME
16.30-17.20	PBL	Elective Course	FREE STUDY TIME	FREE STUDY TIME	FREE STUDY TIME



<b>6th Week</b>	02.06.2025 <b>MONDAY</b>	03.06.2025 <b>TUESDAY</b>	04.06.2025 <b>WEDNESDAY</b>	05.06.2025 <b>THURSDAY</b>	06.06.2025 <b>FRIDAY</b>
<b>08.30-09.20</b>	<b>FREE STUDY TIME</b>	<b>Cell- Tissue Injury And Basics Of The Pharmacology Committee Exam</b>			
<b>09.30-10.20</b>	<b>FREE STUDY TIME</b>	<b>Cell- Tissue Injury And Basics Of The Pharmacology Committee Exam</b>			
<b>10.30-11.20</b>	<b>FREE STUDY TIME</b>	<b>Cell- Tissue Injury And Basics Of The Pharmacology Committee Exam</b>			
<b>11.30-12.20</b>	<b>FREE STUDY TIME</b>	<b>Cell- Tissue Injury And Basics Of The Pharmacology Committee Exam</b>			
<b>13.30-14.20</b>	<b>FREE STUDY TIME</b>				
<b>14.30-15.20</b>	<b>FREE STUDY TIME</b>				
<b>15.30-16.20</b>	<b>FREE STUDY TIME</b>				
<b>16.30-17.20</b>	<b>FREE STUDY TIME</b>				